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POPULATION, LABOR AND EMPLOYMENT
STATISTICS FOR THE
GROW REGION

by
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GROW COMMUNITY DEVELOPMENT PROJECT
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TABLE OF CONTENTS

<u>Table</u>	<u>Page</u>
POPULATION	
1 Population by County, 1960, 1970 and 1976	1
2 Population by County, City, Village, and Township, 1975	2
3 Population by Age, by County, 1970	5
LABOR FORCE AND UNEMPLOYMENT	
4 The Reported Labor Force, 1960, 1970 and 1976	7
5 Potential Labor Force, 1976	9
6 Unemployment Rates 1970 and 1976	11
EDUCATION OF THE LABOR FORCE	
7 Educational Attainment of the Population, 1970 - Years of School Completed by Persons 25 Years and Over	12
8 Public School Enrollments, 1977	13
EMPLOYMENT BY ECONOMIC SECTOR	
9 Covered Employment by Major Economic Sector in the GROW Region, 1960 to 1975	14
10 Agricultural Employment by County, 1970	15
11 Covered Employment by Economic Sector and County, 1976 - Percentage Distribution	16
12 Shift-Share Matrix of Changes in Employment for GROW Region (1960-1970)	17
13 Manufacturing Employment by County, 1970 and 1976	19
INCOME AND EARNINGS	
14 Income by Economic Sector for GROW Counties, 1972	20
15 Payroll of Covered Employment, by Major Economic Sector, for GROW Region, 1960 to 1974	21
16 Manufacturing Payroll by County, 1970 and 1976	22

	<u>Page</u>
17 Average Weekly Earnings in Manufacturing, 1976	23
18 Average Employment and Weekly Earnings of Federal Government Employees, 1976	24
19 Personal Income Per Capita, by County, 1970 and 1975	25
20 Income Distribution and Median Family Income, 1969	26
PRODUCTIVITY	
21 Value Added Per Dollar of Payroll, 1967 and 1972	27

TABLE 1: POPULATION BY COUNTY, 1960, 1970, and 1976

	Population 1960	Population 1970	Percent Change 1960-70	Population 1976	Percent Change 1970-76
Athens	46,998	55,747	+18.6	50,200	- 9.9
Gallia	26,120	25,239	- 3.4	29,700	+17.6
Jackson	29,372	27,174	- 7.5	29,700	+ 9.2
Meigs	22,159	19,799	-10.7	21,500	+ 8.6
Pike	19,380	19,114	- 1.4	20,900	+ 9.3
Vinton	10,274	9,420	- 8.3	10,300	+ 9.3
GROW Region	154,303	156,493	+ 1.4	162,300	+ 3.7
Ohio	9,706,397	10,657,423	+ 9.8	10,690,000	+ 0.3

Source: U. S. Department of Commerce, Bureau of the Census, 1970 Census of Population, and Current Population Survey (P-26, No. 76-35), Government Printing Office, Washington, D. C.

Notes on Table 1:

- 1) The region's average population growth in the 1960's, including Athens County, was only 1.4 percent compared to 9.8 percent for Ohio. But in the 1970-1976 period Ohio's growth slowed to only 0.3% compared to 3.7 percent in the region.
- 2) Five of the six GROW counties lost population in the 1960's but gained population from 1970 to 1976. Athens experienced the reverse due to changes in Ohio University enrollments.
- 3) Excluding Athens, the GROW region's population declined by 6.1 percent in the 1960's but grew by 11.3 percent from 1970 to 1976.
- 4) Gallia County grew most rapidly from 1970 to 1976 with an increase of 17.6 percent, followed by Pike County (9.6%) and Jackson County (9.2%).

TABLE 2: POPULATION BY COUNTY,
CITY, VILLAGE, AND
TOWNSHIP, 1975

	<u>July 1, 1975</u>	<u>Change</u> <u>1970 to 1975</u>	
		<u>Number</u>	<u>Percent</u>
ATHENS COUNTY.....	51 568	-4 179	-7.5
ATHENS.....	19 735	-4 433	-18.3
AMESVILLE.....	276	-19	-6.4
CHAUNCEY.....	1 085	-32	-2.9
ALBANY.....	865	-34	-3.8
GLOUSTER.....	2 137	16	0.8
JACKSONVILLE.....	539	-6	-1.1
TRIMBLE.....	586	44	8.1
COOLVILLE.....	659	-13	-1.9
BUCHTEL.....	589	-3	-0.5
NELSONVILLE.....	4 347	-465	-9.7
ALEXANDER TOWNSHIP.....	1 366	-2	-0.1
AMES TOWNSHIP.....	864	-58	-6.3
ATHENS TOWNSHIP.....	24 612	-4 056	-14.1
BERN TOWNSHIP.....	413	9	2.2
CANAAN TOWNSHIP.....	1 083	-74	-6.4
CARTHAGE TOWNSHIP.....	919	47	5.4
DOVER TOWNSHIP.....	3 382	94	2.9
LEE TOWNSHIP.....	1 837	85	4.9
LODI TOWNSHIP.....	944	40	4.4
ROME TOWNSHIP.....	1 175	30	2.6
TRIMBLE TOWNSHIP.....	4 544	-85	-1.8
TROY TOWNSHIP.....	2 059	106	5.4
WATERLOO TOWNSHIP.....	1 675	-65	-3.7
YORK TOWNSHIP.....	6 693	-252	-3.6
GALLIA COUNTY.....	27 697	2 458	9.7
CHESHIRE.....	342	27	8.6
GALLIPOLIS.....	7 104	-386	-5.2
CROWN CITY.....	377	6	1.6
VINTON.....	263	-89	-25.3
CENTERVILLE.....	129	15	13.2
RIO GRANDE.....	911	97	11.9
ADDISON TOWNSHIP.....	2 284	756	49.5
CHESHIRE TOWNSHIP.....	1 383	-11	-0.8
CLAY TOWNSHIP.....	1 121	57	5.4
GALLIPOLIS TOWNSHIP.....	8 891	-269	-2.9
GREENFIELD TOWNSHIP.....	496	48	10.7
GREEN TOWNSHIP.....	3 230	629	24.2
CUYAN TOWNSHIP.....	1 081	42	4.0
HARRISON TOWNSHIP.....	722	185	34.5
HUNTINGTON TOWNSHIP.....	1 077	-81	-7.0
MORGAN TOWNSHIP.....	913	107	13.3
OHIO TOWNSHIP.....	880	95	12.1
PERRY TOWNSHIP.....	715	11	1.6
RACCOON TOWNSHIP.....	1 732	184	11.9
SPRINGFIELD TOWNSHIP.....	2 394	687	40.2
WALNUT TOWNSHIP.....	779	19	2.5
JACKSON COUNTY.....	29 139	1 965	7.2
OAK HILL.....	1 803	161	9.8
COALTON.....	594	44	8.0
JACKSON.....	7 041	198	2.9
WELLSTON.....	5 689	279	5.2
BLOOMFIELD TOWNSHIP.....	640	32	5.3
COAL TOWNSHIP.....	1 927	201	11.6
FRANKLIN TOWNSHIP.....	1 059	18	1.7
HAMILTON TOWNSHIP.....	390	8	2.1
JACKSON TOWNSHIP.....	1 015	115	12.8
JEFFERSON TOWNSHIP.....	3 263	354	12.2
LIBERTY TOWNSHIP.....	1 068	132	14.1
LICK TOWNSHIP.....	9 250	406	4.6
MADISON TOWNSHIP.....	2 122	132	6.6
MILTON TOWNSHIP.....	901	124	16.0
SCIOTO TOWNSHIP.....	1 225	105	9.4
WASHINGTON TOWNSHIP.....	591	60	11.3

TABLE 2: POPULATION BY COUNTY,
CITY, VILLAGE, AND
TOWNSHIP, 1975

	<u>July 1, 1975</u>	<u>Change</u> <u>1970 to 1975</u>	
		<u>Number</u>	<u>Percent</u>
MEIGS COUNTY.....	21 471	1 672	8.4
RUTLAND.....	583	-80	-12.1
MIDDLEPORT.....	2 677	-107	-3.8
POMEROY.....	2 648	-24	-0.9
RACINE.....	654	71	12.2
SYRACUSE.....	797	113	16.5
BEDFORD TOWNSHIP.....	835	85	11.3
CHESTER TOWNSHIP.....	1 864	291	18.5
COLUMBIA TOWNSHIP.....	787	168	27.1
LEBANON TOWNSHIP.....	791	9	1.2
LETART TOWNSHIP.....	845	-9	-1.1
OLIVE TOWNSHIP.....	1 660	255	18.1
ORANGE TOWNSHIP.....	913	206	29.1
RUTLAND TOWNSHIP.....	2 147	273	14.6
SALEM TOWNSHIP.....	668	-28	-4.0
SALISBURY TOWNSHIP.....	7 294	-9	-0.1
SCIPIO TOWNSHIP.....	730	89	13.9
SUTTON TOWNSHIP.....	2 938	343	13.2
PIKE COUNTY.....	20 644	1 530	8.0
BEAVER.....	336	19	6.0
WAVERLY.....	4 507	-351	-7.2
PIKETON.....	1 476	129	9.6
BEAVER TOWNSHIP.....	1 067	118	12.4
BENTON TOWNSHIP.....	1 196	262	28.1
CAMP CREEK TOWNSHIP.....	680	78	13.0
JACKSON TOWNSHIP.....	1 079	62	6.1
MARION TOWNSHIP.....	1 093	110	11.2
MIFFLIN TOWNSHIP.....	1 095	92	9.2
NEWTON TOWNSHIP.....	1 392	309	28.5
PEBBLE TOWNSHIP.....	1 112	202	22.2
PEE PEE TOWNSHIP.....	6 252	-115	-1.8
PERRY TOWNSHIP.....	717	-14	-1.9
SCIOTO TOWNSHIP.....	939	8	0.9
SEAL TOWNSHIP.....	2 320	257	12.5
SUNFISH TOWNSHIP.....	794	56	7.6
UNION TOWNSHIP.....	907	104	13.0
VINTON COUNTY.....	10 419	999	10.6
HAMDEN.....	989	36	3.8
MCARTHUR.....	1 888	345	22.4
ZALESKI.....	299	-5	-1.6
WILKESVILLE.....	181	-	-
BROWN TOWNSHIP.....	248	-29	-10.5
CLINTON TOWNSHIP.....	1 823	2	0.1
EAGLE TOWNSHIP.....	276	-65	-19.1
ELK TOWNSHIP.....	2 709	473	21.2
HARRISON TOWNSHIP.....	767	55	7.7
JACKSON TOWNSHIP.....	516	78	17.8
KNOX TOWNSHIP.....	406	102	33.6
MADISON TOWNSHIP.....	679	26	4.0
RICHLAND TOWNSHIP.....	1 022	118	13.1
SWAN TOWNSHIP.....	610	65	11.9
VINTON TOWNSHIP.....	568	142	33.3
WILKESVILLE TOWNSHIP.....	795	32	4.2

Source: U. S. Department of Commerce, Bureau of the Census, Current Population Survey (P-25, No. 683), Government Printing Office, Washington, D. C., 1977.

Notes on Table 2:

- 1) The city of Athens lost 18.3 percent of its population from 1970 to 1975 due to declines in Ohio University enrollment.
- 2) The largest urban areas in Gallia, Meigs, and Pike Counties also lost population from 1970 to 1976 with Gallipolis losing 5.2%, Middleport 3.8%, and Waverly 7.2%.
- 3) The major urban areas in Jackson and Vinton Counties, Jackson and McArthur, gained population of 2.9 and 22.4 percent respectively.
- 4) It appears that most of the growth in population from 1970 to 1975 is occurring in small urban areas, villages and rural townships.
- 5) Only four urban areas in the GROW Region had populations of 5,000 or more and are, therefore, classified as cities: Athens, Gallipolis, Jackson, and Wellston. From 1970 to 1975, Athens and Gallipolis experienced population losses of 18.3 and 5.2 percent respectively, while Jackson and Wellston grew by 2.9 and 5.2 percent respectively.

TABLE 3: POPULATION BY AGE, BY COUNTY, 1970

	Median Age	---Age---				Total
		Under 5	5-17	18-64	65 & Over	
Athens						
Percent		6.8	18.4	65.7	9.1	100.0
Number	22.0	3,791	10,257	36,626	5,073	55,747
Gallia						
Percent		6.8	25.2	56.5	11.5	100.0
Number	30.5	1,716	6,360	14,260	2,902	25,238
Jackson						
Percent		7.9	27.1	52.0	13.0	100.0
Number	30.3	2,147	7,364	14,130	3,533	27,174
Meigs						
Percent		7.8	26.1	52.4	13.7	100.0
Number	32.3	1,544	5,168	10,375	2,712	19,799
Pike						
Percent		9.1	28.7	49.9	12.3	100.0
Number	27.9	1,739	5,486	9,538	2,351	19,114
Vinton						
Percent		8.6	27.1	51.8	12.5	100.0
Number	29.3	810	2,553	4,880	1,178	9,421
GROW Region						
Percent		7.5	23.8	57.4	11.3	100.0
Number	27.3	11,747	37,188	89,809	17,749	156,493
Ohio						
Percent	27.9	8.6	26.6	55.4	9.4	100.0

Source: U. S. Department of Commerce, Bureau of the Census,
City and County Data Book, Government Printing Office,
Washington, D. C., 1974.

Notes on Table 3:

- 1) All of these comments refer to 1970, the latest year data is available by age.
- 2) With the exception of Athens and Pike Counties, the 1970 median age was higher in the region than the state average.
- 3) Every county, except Athens, had a higher percentage of persons 65 and over than the state.
- 4) The percentage of working age population in the county was lower than the state average for four counties: Jackson, Meigs, Pike, and Vinton.

TABLE 4: THE REPORTED LABOR FORCE, 1960, 1970 and 1976

	Labor Force, ¹ 1960	Labor Force, ² 1970	Labor Force, ³ 1976	Percent Change, 1960-70	Percent Change, 1970-76
Athens	15,395	18,667	18,070	+21.3	- 3.2
Gallia	7,764	8,574	11,715	+10.4	+36.6
Jackson	9,170	9,604	10,765	+ 4.7	+12.1
Meigs	6,861	6,336	11,223	- 7.7	+77.1
Pike	5,526	5,871	8,580	+ 6.2	+46.1
Vinton	2,803	3,208	4,098	+14.4	+27.7
GROW Region	47,519	52,260	64,451	+10.0	+23.3
Ohio	3,920,000	4,387,000	4,730,000	+11.9	+ 7.8

Sources:

- 1) Ohio Bureau of Unemployment Compensation, Division of Research and Statistics, The Ohio Labor Force by County, Columbus, Ohio, 1962.
- 2) Ohio Bureau of Employment Services, Division of Research and Statistics, Table RS 219-70 (revised), Columbus, Ohio, 1978.
- 3) Ohio Bureau of Employment Services, Division of Research and Statistics, Table RS 219-76 (revised), Columbus, Ohio, 1978.

Notes on Table 4:

- 1) Labor force is defined as the total number of people who either are not employed but have actively sought a job within the past four weeks and are still available for work or are currently employed.
- 2) The 1960 labor force estimates were taken indirectly from the 1970 Census of Population.
- 3) Estimates of the labor force in 1970 and 1976 used in Table 1 are prepared by the Ohio Bureau of Employment Services using the procedure prescribed by the Bureau of Labor Statistics (BLS).
 - (a) These estimates are based on the worker's place of residence, rather than his place of work.
 - (b) The estimates eliminate "second jobs" from the county of employment, i.e., they attempt to measure the number of persons employed as opposed to the number of jobs held.

- 4) From 1960 to 1970, the labor force in the GROW Region increased at a rate slightly less than that of the state. However, from 1970 to 1976, the GROW labor force expanded three times more rapidly than the state figure, with rates of 23.3% and 7.8% respectively.
- 5) The GROW Region had a total labor force of 64,451 in 1976.
- 6) The greatest increases in labor force from 1970 to 1976 came in Meigs, Pike, and Gallia Counties with respective increases of 77, 46, and 37 percent.
- 7) The substantial increase in the Meigs County labor force (77.1%) is thought to be too high. There are three factors which limit the accuracy of this estimate and, to a greater or lesser extent, the estimates of the other five counties as well. They are:
 - (a) The amount of farming. Agricultural employment is not covered by Ohio's unemployment compensation law. Since no employment reports are filed for agricultural work, labor force estimates for those counties with substantial agricultural employment are subject to a greater degree of error.
 - (b) The size of the population. As with any estimation technique, the smaller the population to be considered, the greater the chance for error.
 - (c) The technique prescribed by the BLS. The technique used for county-level estimates involves the use of statistical relationships derived from the 1970 Census. If these relationships are outdated, then results may be erroneous.
- 8) After rising by 21.3% in the 1960's, the Athens County labor force fell by 3.2% from 1970 to 1976.

TABLE 5: POTENTIAL LABOR FORCE, 1976

	Reported ¹ Labor Force	Labor Force ² Participation Rate	Potential ³ Labor Force	Discouraged ⁴ Workers
Athens	18,070	51.9	20,311	2,241
Gallia	11,715	64.3	12,359	644
Jackson	10,765	62.2	12,437	1,672
Meigs	11,223	90.2	11,223	0
Pike	8,580	72.4	8,580	0
Vinton	4,098	68.6	4,291	193
GROW Region	64,451	64.0	69,201	4,750
Ohio	4,730,000	71.8	4,730,000	0

Sources:

- 1) Ohio Bureau of Employment Services, Division of Research and Statistics, Table RS 219-76, Columbus, Ohio, 1978.
- 2) Calculated by dividing the reported labor force by the estimated 1976 population aged 18 through 64 and multiplying times 100.
- 3) Calculated by multiplying the estimated population aged 18 through 64 times the labor force participation rate for Ohio. The Athens and Gallia County labor forces were specially estimated due to the presence of Ohio University in Athens and the Gallipolis State Institute in Gallipolis. Meigs and Pike Counties were not adjusted since their participation rates exceed the state average.
- 4) Calculated by subtracting reported labor force from potential labor force.

Notes on Table 5:

- 1) Labor force participation rate is the percentage of working-age adults who are either working or actively looking for work. In this case, working age was defined as 18 through 64.

- 2) Potential labor force is conceptually defined as the total number of people who either are employed or would like to be employed. These unemployed people need not be actively seeking work, but must be ready and able to work if the opportunity arises. In this case, the operational definition of potential labor force is the number of working-age adults in an area times the state labor force participation rate. If the local participation rate is greater than the state participation rate, then the county labor force is assumed to have already reached its "potential" and the local rate is to be used.
- 3) Discouraged workers are people who are not employed, but, because they perceive a lack of job opportunities, do not look for work either. These people would like to work and would seek employment if something were available. Discouraged workers are not counted as part of the official estimates of labor force.
- 4) The labor force participation rate, being based on an estimate of the number of working-age adults, is subject to a degree of error, particularly in the case of counties with small populations. However, the numbers are sufficiently large when considering the GROW Region in its entirety that the participation rate for the region may be considered reasonably accurate.
- 5) The labor force participation rate for Ohio is 71.8% compared to only 64.0% for the GROW Region.
- 6) There are more than 4,700 discouraged workers in the GROW Region.

TABLE 6: UNEMPLOYMENT RATES, 1970 and 1976

	Reported Rate ¹ 1970	Adjusted Rate, ² 1970	Reported Rate, ³ 1976	Adjusted Rate, ² 1976
Athens	4.7	8.5	8.9	19.0
Gallia	8.1	16.7	8.9	13.6
Jackson	9.6	17.0	10.0	22.1
Meigs	8.5	24.4	6.7	6.7
Pike	10.3	25.5	12.0	12.0
Vinton	6.6	16.9	9.0	13.1
GROW Region	7.4	17.9	9.1	14.1
Ohio	5.3	5.3	7.8	7.8

Sources:

- 1) Ohio Bureau of Employment Services, Division of Research and Statistics, Table RS 219-70 (revised), Columbus, Ohio, 1978.
- 2) Estimated by setting the labor force participation rate equal the state average. Athens and Gallia Counties were handled specially due to the large numbers of working-age persons ineligible for work at Ohio University (students) and Gallipolis State Institute (patients) respectively.
- 3) Ohio Bureau of Employment Services, Division of Research and Statistics, Table RS 219-76, Columbus, Ohio, 1978.

Notes on Table 6:

- 1) The adjusted unemployment rate is designed to measure unemployment including discouraged workers. It is calculated using an estimate of potential labor force. For more information on the calculation of unemployment rates see Table 2 or the GROW research publication "Labor Force and Unemployment in the GROW Region", ESO 505, by Gerard and Morse.
- 2) Adjusted unemployment rates for the GROW Region in 1970 ranged from a high of 25.5% for Pike County to a low of 8.5% for Athens County. The GROW adjusted rate was 17.9%. In 1976, unemployment was generally down in the GROW Region with a high of 22.1% in Jackson County and a low 6.7% in Meigs County. Over the whole six county area, the adjusted rate was 14.1%.
- 3) From 1970 to 1976, the GROW Region's officially reported rate of unemployment grew by 23% (from 7.4 to 9.1 percent) compared to a 47% (from 5.3 to 7.8 percent) increase for Ohio.
- 4) The 1976 GROW Region adjusted rate (14.1%) was just under twice the state rate (7.8%), rather than over three times the state rate as in 1970.

TABLE 7: EDUCATIONAL ATTAINMENT OF THE POPULATION, 1970
YEARS OF SCHOOL COMPLETED BY PERSONS 25 YEARS AND OVER

	<u>Persons 25 Years Old and Over</u>	<u>Median (Years)</u>	<u>Less Than 5 Years (Percent)</u>	<u>4 Years of High School or More (Percent)</u>	<u>4 Years of College or More (Percent)</u>
Athens	23,292	12.2	3.0	57.8	14.8
Gallia	14,337	10.0	NA	38.0	5.0
Jackson	15,111	10.5	5.9	39.9	4.4
Meigs	11,350	10.5	4.7	39.7	2.9
Pike	10,185	9.9	8.3	38.3	6.7
Vinton	5,147	10.1	3.0	38.5	4.5
GROW Region	79,422	10.8	4.8	44.5	7.6
Ohio	5,700,317	12.1	3.5	53.2	9.3

Source: U. S. Department of Commerce, Bureau of the Census, County and City Data Book, Government Printing Office, Washington, D. C., 1972.

Notes on Table 7:

- 1) Education is frequently used as a rough indicator of a labor force's suitability to perform certain jobs. A low median level of educational attainment will generally diminish a community's chances for consideration for highly-skilled work.
- 2) It should be noted that the figures from Table 7 are from 1970. More recent educational attainment figures for small rural counties are not available. However, there are indicators that the median figures for the GROW Region have increased substantially.
 - a) A recent survey of persons who have migrated to the GROW Region since 1970 with the intent to become permanent residents shows that the median number of years of school completed by these persons is 12.6.
 - b) In a 1975 report to Congress, The U. S. Department of Agriculture states that the median number of years of education in nonmetropolitan areas has increased dramatically in recent years to the point where now it is almost universally 12 years or more.
- 3) Athens County leads the GROW Region in educational attainment, consistently showing a record better than the state average. This is due to the presence of Ohio University in the City of Athens.

TABLE 8: PUBLIC SCHOOL ENROLLMENTS, 1977

	Kindergarten and Elementary	High School	Total	Percentage Change in Total Enrollment Since 1970
Athens	7,045	3,285	10,330	+ 2.7
Gallia	4,350	2,088	6,438	+ 8.1
Jackson	4,680	2,065	6,745	- 3.9
Meigs	3,429	1,630	5,059	+ 2.7
Pike	4,002	1,836	5,838	+ 2.4
Vinton	1,797	796	2,593	+10.2
GROW Region	25,303	11,700	37,003	+ 2.8
Ohio	1,450,907	726,314	2,177,221	- 6.7

Source: Ohio Department of Education

Notes on Table 8:

- 1) Public school enrollment from 1970 to 1977 decreased in Jackson County by 3.9%, but increased in the other five counties by anywhere from 2.4 to 10.2 percent.
- 2) Public school enrollment in the GROW Region increased by 2.8%, while enrollment across the state dropped 6.7%.

TABLE 9: COVERED EMPLOYMENT BY MAJOR ECONOMIC SECTOR IN THE GROW REGION, 1960 to 1975

Year	Total* Employment for the Region	Quarry and Mining %	Contract Construction %	Manufac- turing %	Transpor- tation and Utilities %	Wholesale and Retail %	Finance, Insurance and Real Estate %	Services %
1960	14069	8.2	4.2	34.8	11.7	30.3	3.2	6.7
1970	16235	3.5	6.0	31.6	14.6	30.7	4.9	8.3
1971	24566	1.9	16.5	22.6	10.3	26.4	4.6	15.7
1974	34151	5.0	13.9	23.9	10.8	25.4	4.9	15.2
1975	23677	8.9	5.8	23.1	11.6	27.7	4.1	17.9

Source: "Labor Productivity and Turnover in Manufacturing Industries: The Case of A Five County Region" by Emmanuel T. Acquah (unpublished Ph.D. dissertation), Department of Agricultural Economics and Rural Sociology, The Ohio State University, 1976. Data derived from the Ohio Bureau of Employment.

Notes on Table 9:

- 1) This table excludes employment in agriculture and local and state government.
- 2) These figures include only five counties, since this table is from a report issued before Pike County was added to the GROW Region.
- 3) From 1960 to 1970 employment grew by 15.4 percent. From 1970 to 1975 it grew by 45.8 percent.
- 4) The percentage of employees in mining fell from 8.2 in 1960 to 1.9 in 1971. Due to the opening of the James Gavin Power Plant and the associated deep coal miners, its importance has increased, reaching 8.9 percent in 1975.
- 5) Contract construction employment increased dramatically in 1971 through 1974 when the Gavin Power Plant was being built.
- 6) While 573 manufacturing jobs were added from 1960 to 1975, only 23 percent of the non agricultural workers are employed in this sector in 1975 compared to 35 percent in 1960.
- 7) The percentage of employees in transportation and utilities, wholesale and retail, and finance, insurance and real estate has remained relatively stable from 1960 to 1975.
- 8) Service sector employment has expanded from 6.7 percent in 1960 to 17.9 percent in 1975, or over 2.6 times the original share.

* Excludes agriculture and local government.

TABLE 10: AGRICULTURAL EMPLOYMENT BY COUNTY, 1970

	Number Employed in Agriculture	Percent of Total Employment
Athens	422	2.3
Gallia	551	7.2
Jackson	217	2.6
Meigs	400	6.9
Pike	263	5.3
Vinton	211	7.7
GROW Region	2,064	4.3
Ohio	86,404	2.1

Source: Ohio Bureau of Employment Services,
Division of Research and Statistics,
Employment by Industry in Ohio Counties
1940-1970, Columbus, Ohio, 1976.

Notes on Table 10:

- 1) This table includes only persons whose principal source of income is agricultural employment.
- 2) Agricultural employment is better than twice as prevalent in the GROW Region (4.3%) as in Ohio (2.1%).
- 3) The percentage of total employment in agricultural work in the GROW counties ranged from a high of 7.7% for Vinton County to a low of 2.3% for Athens County.

TABLE 11: COVERED EMPLOYMENT BY ECONOMIC SECTOR AND COUNTY, 1976--
PERCENTAGE DISTRIBUTION

	Mining	Construction	Manufacturing	Transportation & Utilities	Wholesale and Retail Trade
Athens	.5	2.1	10.5	9.4	23.1
Gallia	1.0	6.0	11.9	10.0	21.0
Jackson	3.7	2.9	40.0	4.2	21.8
Meigs	40.1	3.8	8.1	10.5	16.3
Pike	--	2.0	55.8	3.0	11.3
Vinton	9.6	3.6	35.1	4.7	11.5
GROW Region	6.5	3.3	23.0	7.7	19.4
Ohio	.7	4.1	34.4	4.8	23.7

	Finance, Insurance, and Real Estate	Services	State & Local Government	Total
Athens	3.8	13.2	37.5	100.0
Gallia	2.4	22.1	25.7	100.0
Jackson	3.7	8.9	14.8	100.0
Meigs	2.4	7.4	11.5	100.0
Pike	2.3	6.8	18.8	100.0
Vinton	2.9	6.6	26.0	100.0
GROW Region	3.1	12.3	24.7	100.0
Ohio	4.6	16.2	11.6	100.0

Source: Ohio Bureau of Employment Services, Division of Research and Statistics, "Covered Employment and Payrolls" (RS 203 series), Columbus, Ohio, 1977.

Notes on Table 11:

- 1) Table 11 is derived from employers' reports of workers covered by the Ohio Unemployment Compensation Law. It is based on the number of jobs by place of employment, not the number of workers by place of residence.
- 2) Mining employes 6.5 percent of the work force in the GROW Region, or better than nine times the state average. These jobs are concentrated in Meigs County where 40.1% of the covered employment is in mining.
- 3) State and local government jobs are twice as common in the GROW Region as in Ohio. They range from a high of 37.5% of covered employment in Athens County to a low of 11.5% in Meigs County.

TABLE 12: SHIFT-SHARE MATRIX OF CHANGES IN EMPLOYMENT
FOR THE GROW REGION (1960-1970)

	NG	IM	RG	Δ
Food and kindred products	155	-380	195	-32
Textile	72	-74	-102	-104
Lumber	138	-229	104	73
Printing	206	-204	-477	-474
Chemicals	118	-56	-12	50
Electrical	158	36	-168	25
Transportation	40	-12	114	142
Miscellaneous	<u>464</u>	<u>36</u>	<u>406</u>	<u>930</u>
Total	1351	-883	60	550
IM + RG = NC			-823	

NG = Change in employment related to national growth
IM = Change in employment related to industrial mix
RG = Change in employment related to regional share
NC = Net relative change in employment
Δ = Total change in employment

Source: Shift-share analysis for Ohio, by Paul Miller
and Earl Stephenson, June 1974.

Notes for Table 12:

- 1) Shift share analysis is a descriptive technique which attributes economic growth in a region to three components-- national growth effect, industrial mix effect, and the regional share mix.
- 2) This table is based on data from only five counties, since Pike County was not a part of the GROW Region at the time the matrix was prepared.

- 3) In Table 12, the column NG shows the number of additional jobs which would have occurred in the region if all economic sectors had grown at the national average, i.e. an additional 1351 jobs.
- 4) Column IM in Table 12 shows the change in jobs if each firm in the region grew (or declined) the same rate as its industry in the rest of the nation. Most of the manufacturing jobs in the GROW Region during the 1960's were in declining industries resulting in a reduction of 883.
- 5) The RG column shows whether the region's proportionate share of each sector is increasing or decreasing relative to other areas in the nation. If the local share of an industry is increasing the region has demonstrated a relative advantage for this activity. For example, the region demonstrated a comparative advantage in food and kindred products, lumber, transportation, and miscellaneous manufacturing. The other sectors appear to be at a relative disadvantage in this region.
- 6) The realized change in manufacturing employment in the region fell short of the national employment growth standard by 823 workers between 1960 and 1970.

TABLE 13: MANUFACTURING EMPLOYMENT, BY COUNTY, 1970 and 1976

	1970	1976	Percent Change 1970-76
Athens	1,719	1,221	- 29.0
Gallia	437	893	+104.3
Jackson	2,060	2,599	+ 26.2
Meigs	401	386	- 3.7
Pike	1,791	2,884	+ 61.0
Vinton	495	637	+ 28.7
GROW Region	6,903	8,620	+ 24.9
Ohio	1,403,801	1,293,631	- 7.8

Source: Ohio Bureau of Employment Services, Division of Research and Statistics, "Covered Employment and Payrolls" (RS 203 series), Columbus, Ohio, 1977.

Notes on Table 13:

- 1) Table 13 indicates manufacturing employment has changed considerably in the GROW counties since 1970. This change varies from a decline of 29% in Athens County to an increase of 104% in Gallia County.
- 2) The GROW Region showed an increase of nearly 25% in manufacturing employment in the first six years of this decade, while Ohio lost 7.8%.

TABLE 14: INCOME BY ECONOMIC SECTOR FOR GROW COUNTIES, 1972

	Athens	Gallia	Jackson	Meigs	Vinton	GROW Region	% of Total
<u>1972 (\$1,000)</u>							
Agriculture	2,223	1,232	736	966	246	5,403	1.37
Manufacturing	11,501	6,453	15,830	2,554	5,611	41,949	10.64
Mining	516	1,085	3,440	1,515	906	7,462	1.89
Construction	5,166	16,038	3,479	3,386	1,157	29,226	7.41
Transportation	13,650	9,849	5,951	3,459	1,188	34,097	8.65
Trade	16,563	8,014	8,300	5,425	1,653	39,955	10.13
Finance	2,852	1,669	1,662	800	402	7,385	1.87
Services	14,430	8,733	5,403	3,373	704	32,643	8.28
Others	487	289	232	185	90	1,283	.32
Federal Civilian	2,113	614	675	683	237	4,322	1.09
Federal Military	887	255	297	224	119	1,782	.45
State and Local Government	59,691	16,660	7,734	3,887	3,096	91,068	23.11
Property Income	15,716	9,505	10,321	4,987	2,177	42,706	10.83
Transfer Payments for Personal Less Contributions	<u>17,989</u>	<u>9,885</u>	<u>13,409</u>	<u>9,770</u>	<u>3,729</u>	<u>54,782</u>	<u>13.90</u>
Total	163,784	90,680	77,802	41,550	21,401	394,063	100.00

Source: Regional Economic Information Systems, Bureau of Economic Analysis,
U. S. Department of Commerce.

Notes on Table 14:

- 1) Table 14 shows the relative importance in 1972 of economic sectors in each county. (Pike County was not included in the region when this data was collected.)
- 2) While manufacturing contributed 10.6% of the region's income in 1972, it was not a major source in Athens, Gallia or Meigs.
- 3) Despite Vinton County's small manufacturing sector, it contributed 26.2 percent of the total income in the county, more than any other sector.
- 4) Jackson was the most important center for manufacturing in 1972 with income from this sector of \$15.83 million.
- 5) State and local government generated 23 percent of the income in the region with 37 percent from this source in Athens.

TABLE 15: PAYROLL OF COVERED EMPLOYMENT, BY MAJOR ECONOMIC SECTOR,
FOR THE GROW REGION, 1960 to 1974*

(In millions of dollars)

Year	Total Income	Quarry and Mining	Contract Construction	Manufac- turing	Transpor- tation and Utilities	Wholesale and Retail	Finance, Insurance and Real Estate	Services
1960	55.2	4.8	2.6	21.8	8.5	12.8	1.8	2.3
1970	97.2	4.5	9.1	32.4	18.8	21.4	3.4	6.1
1971	107.	5.6	10.8	35.	20.5	23.1	4.8	6.7
1973	234.9	8.5	55.3	39.1	26.1	31.3	7.1	18.6
1974	288.3	16.	54.9	44.9	30.8	34.5	8.1	21.8

Source: Ohio Bureau of Employment

Notes on Table 15:

- 1) This table only includes five counties, since Pike County was not part of the GROW Region at the time the data was collected.
- 2) Total covered payroll in non-agricultural industries increased by 422 percent from 1960 to 1974. In real terms there was a 228 percent increase in payrolls.
- 3) The relative importance of manufacturing has declined from 39.5 percent of the total in 1960 to 15.6 percent in 1974. However, the real payroll from manufacturing has increased by \$6.4 million.
- 4) Contract construction payrolls increased from 4.7% in 1960 to 19% in 1974.
- 5) In 1974 the state and local government sector generated \$73.2 million or 25.4 percent of the total payroll of \$288.3 million.
- 6) Since the definition of covered employment was broadened in 1972, the rapid increase in service industry employment is misleading.

* Excludes agriculture

TABLE 16: MANUFACTURING PAYROLL BY COUNTY, 1970 and 1976

	1970	1976	Percent Change
	(millions of \$)		
Athens	11.0	11.2	1.8
Gallia	3.2	8.4	62.5
Jackson	12.8	23.5	83.6
Meigs	2.4	3.4	41.7
Pike	15.2	40.7	167.8
Vinton	3.1	5.6	80.6
GROW Region	47.7	92.9	94.8
Ohio	12,511.9	18,160.1	45.1

Source: Ohio Bureau of Employment Services, Division of Research and Statistics, (RS 203 series), Columbus, Ohio, 1971 and 1977.

Notes on Table 16:

- 1) The greatest increase in manufacturing payroll occurred in Pike County with growth of 168 percent followed by Jackson and Vinton with 84 and 81 percent respectively.
- 2) While Athens County had a nominal increase of 1.8 percent in real income the payroll declined by 36.8 percent.
- 3) The GROW Region had an average increase of 94.8 percent compared to a 45.1 percent increase in Ohio.

TABLE 17: AVERAGE WEEKLY EARNINGS IN MANUFACTURING, 1976

	All Manufacturing	Durable Goods	Nondurable Goods
Athens	\$176.99	\$215.49	\$158.53
Gallia	181.04	180.73	181.60
Jackson	174.17	199.50	159.04
Meigs	167.92	160.76	184.59
Pike	271.95	N.A.	N.A.
Vinton	169.74	N.A.	N.A.
GROW Region	207.39	192.72	162.39
Ohio	269.96	278.82	248.99
U.S.	207.60	225.00	183.56

Sources:

- 1) Ohio Bureau of Employment Services, Division of Research and Statistics, "Covered Employment and Payrolls" (RS 203 series), Columbus, Ohio, 1977.
- 2) U. S. Department of Commerce, Bureau of the Census, Statistical Abstract of the U.S., Government Printing Office, Washington, D. C., 1977.

Notes on Table 17:

- 1) The average weekly earnings for durable and nondurable goods in the GROW Region do not include Pike and Vinton Counties. Figures for those two counties are not available.
- 2) Average weekly earnings in manufacturing are important because manufacturing is the single largest industrial division in employment and tends to have more flexibility in locating than firms in other divisions. Provided an adequate transportation system exists, a manufacturing firm can locate in an economically under-developed area. Firms in most other industrial divisions must locate in areas where the local economy is already expanding.
- 3) Table 17 shows Pike County's average weekly earnings in manufacturing of \$272 is 31% above the GROW Region average.
- 4) The average weekly earnings in the GROW Region and the U.S. are nearly the same (about \$207), while the Ohio average is 30% higher.

TABLE 18: AVERAGE EMPLOYMENT AND AVERAGE WEEKLY EARNINGS OF FEDERAL GOVERNMENT EMPLOYEES, 1976

	Average Employment	Average Weekly Earnings	Earnings as a Percentage of U.S. Average
Athens	214	\$248.18	87.9
Gallia	77	241.15	85.5
Jackson	61	267.45	94.7
Meigs	70	246.60	87.6
Pike	39	237.13	84.0
Vinton	23	239.74	85.1
GROW Region	484	247.97	87.9
Ohio	91,894	303.07	107.4
U.S.	2,879,000	282.28	100.0

Sources:

- 1) Ohio Bureau of Employment Services, Division of Research and Statistics, "Average Employment, Total Payroll, and Average Weekly Earnings of Federal Government Employees in Ohio, by County" (RS 203.5), Columbus, Ohio, 1977.
- 2) U.S. Department of Commerce, Bureau of the Census, Statistical Abstract of the U.S., Government Printing Office, Washington, D. C., 1977.

Notes on Table 18:

- 1) The average weekly earnings of federal employees in an area are considered useful as a comparative index of the prevailing wage for full-time workers in that area. Actual wage figures are not available for many small rural areas, since disclosure of such information is prohibited if fewer than three firms are involved.
- 2) Federal workers in all six GROW counties receive lower average weekly earnings than federal workers across either the state or the nation. As a percentage of the U.S. average, the GROW counties vary from a low of 84% for Pike County to a high of 95% for Jackson County, with a regional average of 88%.

TABLE 19: PERSONAL INCOME PER CAPITA, BY COUNTY, 1970 and 1975

	1970	1975	Percent Change
	(current \$)	(current \$)	
Athens	2594	4001	54.2
Gallia	2290	3953	72.6
Jackson	2473	4039	63.3
Meigs	2192	4615	110.5
Pike	2337	3998	71.1
Vinton	2060	3356	62.9
GROW Region	2409	4040	67.7
Ohio	4020	5883	46.3
U. S.	3966	5834	47.1

Source: U. S. Department of Commerce, Bureau of Economic Analysis, Survey of Current Business, Government Printing Office, Washington, D. C.

Notes on Table 19:

- 1) The nominal increase in per capita incomes was 67.7% in the region compared to 46.3% in the state.
- 2) Incomes per capita in GROW were 68.6% of the state average in 1975 compared to 59.9% in 1970.
- 3) The values shown in Table 19 are in current dollars. Current dollars in 1975 were only worth 72 percent of the 1970 dollars. Unless the per capita income in 1975 was at least 1.39 times the 1970 income there was a decline in real income.
- 4) The GROW counties had a 20.7% increase in real incomes from 1970 to 1975.

TABLE 20: INCOME AND MEDIAN FAMILY INCOME DISTRIBUTION, 1969

County	1969 Median Family Income	Less than \$3000 (percent)	\$3000- 9999 (percent)	\$10,000- 14,999 (percent)	\$15,000 and up (percent)
Athens	\$ 7,628	13.6	54.7	20.2	11.5
Gallia	6,909	20.0	53.2	17.8	9.0
Jackson	6,635	20.0	55.4	17.1	7.5
Meigs	6,485	22.0	57.2	16.6	4.2
Pike	6,546	22.2	50.1	19.2	8.5
Vinton	6,332	21.4	56.3	15.1	7.2
GROW Region	6,932	18.7	54.4	18.2	8.6
Ohio	10,309	9.9	37.7	30.8	21.6

Source: U. S. Department of Commerce, Bureau of the Census, City and County Data Book, Government Printing Office, Washington, D. C., 1974.

Notes on Table 20:

- 1) In 1969, median family income in Ohio was 48.7% higher than in the GROW Region. Athens County had the highest GROW county median family income (\$7,628), but the Ohio figure was 35.1% above that.
- 2) The percentage of families in the GROW Region with annual incomes below \$3,000 in 1969 was 18.7%, nearly double the rate for Ohio.
- 3) In 1969 the poverty level of income for a non-farm family of four persons was \$3,743, which was 39.7 percent of the U. S. median family income.
- 4) The percentage of families in Ohio with annual incomes of \$15,000 or more in 1969 was better than two-and-a-half times the percentage in the GROW Region.

TABLE 21: VALUE ADDED PER DOLLAR OF PAYROLL,
1967 and 1972

	1967 ¹	1972 ²	Percent Change 1967-72
Athens	\$1.61	\$1.97	+22.4
Gallia	2.00	2.62	+31.0
Jackson	1.96	2.66	+35.7
Meigs	2.07	2.13	+ 2.9
Pike	N.A.*	2.73	---
Vinton	2.00	1.24	-38.0
GROW Region	1.89	2.24	+18.5
Ohio	1.94	1.97	+ 1.5

Sources:

- 1) U. S. Department of Commerce, Bureau of the Census, 1967 Census of Manufactures, Government Printing Office, Washington, D. C., 1970.
- 2) U. S. Department of Commerce, Bureau of the Census, 1972 Census of Manufactures, Government Printing Office, Washington, D. C., 1975.

Notes on Table 21:

- 1) Value added per dollar of payroll is one way to estimate the productivity of workers. In Table 21 productivity is measured as the increase in the value of manufactured products contributed by each dollar of total payroll. If this figure equals \$1 the manufacturing process only increases the value of the product by the cost of the labor that went into it. Other costs, such as depreciation of equipment, are not covered. Thus, if businesses are not to lose money, the productivity figure must be greater than \$1.

* Not available

- 2) Four out of the six GROW counties showed improvement in worker productivity from 1967 to 1972. No figure was available for Pike County in 1967 and Vinton County registered a 38% drop in productivity over the period.
- 3) Values added per dollar of payroll varied for the GROW counties in 1972 from a high of \$2.73 for Pike to a low of \$1.24 for Vinton.
- 4) The 1972 figure for the GROW Region does not include Pike County. This is done so that the 1967 and 1972 figures are comparable. The 1972 value added per dollar of payroll for the GROW Region including Pike County is \$2.41.
- 5) Though slightly behind the state in 1967, productivity in the GROW Region has improved at a rate over twelve times greater than that of the state. By 1972, worker productivity was 22% higher in the GROW Region than in Ohio.